WHAT IS CLAIMED IS:

1. An image decoding apparatus for decoding a first coded bit stream into which first header information and image coded data encoded in a first coding scheme are multiplexed, or for decoding a second coded bit stream into which second header information and image coded data encoded in a second coding scheme are multiplexed, said image decoding apparatus comprising:

coding scheme decision means for making a decision as to whether a received coded bit stream is the first coded bit stream or the second coded bit stream in response to the first header information or to the second header information;

decoding means for decoding image coding information on the second coding scheme included in the second header information by receiving the second coded bit stream; and

setting means for setting, by receiving the first coded bit stream, the image coding information on the second coding scheme in response to image coding information on the first coding scheme included in the first header information,

wherein said image decoding apparatus decodes the image coded data included in the first coded bit stream or in the second coded bit stream in response to the image coding information set by said setting means or in response to the image coding information decoded by said decoding means.

2. The image decoding apparatus according to claim 1, wherein said coding scheme decision means makes the decision in response to coding scheme identification information for identifying the first or second coding scheme, the coding scheme identification information being included in the first header information or in the second header information. 30

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- 3. The image decoding apparatus according to claim 1, wherein said coding scheme decision means makes the decision in response to a start code included in the first header information or in the second header information.
- 4. The image decoding apparatus according to claim 3, wherein said coding scheme decision means makes the decision in response to an H.263 start code included in the first header information, or to a VOL (Video Object Layer) start code included in the second header information.
- 5. The image decoding apparatus according to claim 3, wherein said coding scheme decision means makes the decision in response to a picture start code included in the first header information, or to a VO (Video Object) start code included in the second header information.
- 6. An image coding apparatus comprising:

coding means for generating a first coded bit stream by encoding an image signal in a first coding scheme; and

header information multiplexing means for multiplexing, into the first coded bit stream, header information for ensuring compatibility with a second coded bit stream encoded in a second coding scheme.

7. The image coding apparatus according to claim 6, wherein said header information multiplexing means multiplexes, as the header information for ensuring the compatibility, a start code of the second coding scheme, and coding scheme identification

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information indicative of the first coding scheme.

8. An image communications system comprising:

coding means for generating a first coded bit stream by encoding an image signal in a first coding scheme;

decoding means for decoding a second coded bit stream coded in a second coding scheme; and

coded bit stream converting means for transmitting the first coded bit stream received from said coding means to said decoding means, after multiplexing into the first coded bit stream header information for ensuring compatibility, which is received from said decoding means.

9. A coded bit stream converting apparatus comprising:

syntax analyzing means for inputting a first coded bit stream generated in a first coding scheme, and for extracting first header information in the first coding scheme and image coded data;

decoding means for decoding the first header information extracted;

header information setting means for setting and coding second header information in a second coding scheme in response to the first header information decoded by said decoding means; and

25 multiplexing means for generating a second coded bit stream by multiplexing image coded data extracted by said syntax analyzing means with the second header information coded by said header information setting means.

30 10. An image decoding apparatus for decoding a first coded bit

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stream into which first header information and image coded data encoded in a first coding scheme are multiplexed, or for decoding a second coded bit stream into which second header information and image coded data encoded in a second coding scheme are multiplexed, said image decoding apparatus comprising:

coding scheme decision means for making a decision as to whether a received coded bit stream is the first coded bit stream or the second coded bit stream in response to the first header information or to the second header information;

first decoding means for decoding the first header information by receiving the first coded bit stream; and

second decoding means for decoding image coding information on the second coding scheme included in the second header information by receiving the second coded bit stream,

wherein said image decoding apparatus decodes, when the coded bit stream received is the first coded bit stream, the image coded data included in the first coded bit stream in response to the first header information decoded by said first decoding means, and decodes, when the coded bit stream received is the second coded bit stream, the image coded data included in the second coded bit stream in response to the image coding information decoded by said second decoding means.

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